6 **(a)** Convert the denary number 150 into an 8-bit binary number.

..... [1]

working space

.....

.....

.....

(b) Convert the hexadecimal number F08 into a 12-bit binary number.

..... [1]

working space

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.....

.....

(c) Give the 8-bit binary value after a logical binary shift left of two places is performed on the binary number 00110101.

..... [1]

working space

.....

.....

.....

(d) Convert the two's complement binary integer 01110101 into denary.

..... [1]

working space

.....

.....

.....

(e) Add the **two** binary integers using binary addition and give your answer in binary. Show all your working.

```
  0 0 0 1 1 0 1 0
+ 0 1 1 0 1 1 1 0
```

[3]